

In the Claims

Please amend claims 1-2, 5-8, and 14-17 as follows:

1. (Currently amended) A method of stimulating an efficient CD8⁺ response in a human infected with an HIV or HTLV-1 retrovirus said method comprising:

administering to the human, a nucleic acid-based vaccine, which enters the cells of the human and intracellularly produces HIV- or HTLV-1 specific peptides for presentation on the cell's MHC class I molecules,

where said peptides are presented in an amount sufficient to stimulate a protective CD8⁺ HIV structural antigen response, and

where said human

i. has a viral load of less than 10,000 viral copies per ml of plasma and a CD4⁺ cell count of above 500 cells/ml, and

ii. has been treated with one or more anti-viral agents, which contributed to a lower viral copy and higher CD4⁺ cell count than before treatment.

2. (Currently amended) A method of claim 1 wherein the human has been treated with ~~an~~ anti-viral agents, which resulted in the human having a viral load of less than 1,000 viral copies per ml of blood serum and a CD4⁺ cell count of above 500 cells/ml.

3. (Original) A method of claim 2 wherein the anti-viral agents comprise a combination of protease inhibitors and inhibitors of reverse transcriptase.

4. (Original) A method of claim 1 wherein the vaccine is a DNA based vaccine.

5. (Currently amended) A method of claim 1 wherein the nucleic acid-based vaccine is delivered by an attenuated recombinant virus.

6. (Currently amended) A method of claim 5 wherein the vaccine is an attenuated recombinant virus comprises a pox virus.

7. (Currently amended) A method of claim 6 wherein the attenuated recombinant pox virus comprises is selected from the group consisting of NYVAC or and ALVAC.
8. (Currently amended) A method of claim 6 wherein the attenuated recombinant pox virus comprises is MVA.
9. (Original) A method of claim 1 where the vaccine is administered a second time.
10. (Currently amended) A method of claim 1 wherein the HIV- or HTLV-1-specific peptides are structural viral peptides.
11. (Canceled).
12. (Original) A method of claim 1 wherein the vaccine further comprises an adjuvant.
13. (Original) A method of claim 1 further comprising administering interleukin 2 or CD40 ligand in an amount sufficient to potentiate the CD8⁺ response.
14. (Currently amended) A method of claim 1 where the person human has been infected with HIV and has demonstrated repeated and sustained proliferative T-cell responses to gp120 envelope protein.
15. (Currently amended) A method of claim 14 where the person human has demonstrated repeated and sustained proliferative T-cell responses to p24 gag antigen.
16. (Currently amended) A method of claim 1 where the person human is infected with HIV and is further tested by a skin test for a hypersensitive response to p24 gag antigen.

17. (Currently amended) A method of claim 1 where the ~~person~~ human is infected with HIV and is further tested by a skin test for a hypersensitive response to gp120 envelope antigen.